## 【配列表】

## SEQUENCE LISTING

<110> RIKEN

AJINOMOTO CO., INC.

<120> A method for providing a property of stress-resistance

<130> RJH12-099K

<140>

<141>

<160> 15

<170> PatentIn Ver. 2.0

<210> 1

<211> 344

<212> PRT

<213> Arabidopsis thaliana

<400> 1

Met Ala Pro Gly Leu Thr Gln Thr Ala Asp Ala Met Ser Thr Val Thr 1 5 10 15

Ile Thr Lys Pro Ser Leu Pro Ser Val Gln Asp Ser Asp Arg Ala Tyr
20 25 30

Val Thr Phe Leu Ala Gly Asn Gly Asp Tyr Val Lys Gly Val Val Gly 35 40 45

Leu Ala Lys Gly Leu Arg Lys Val Lys Ser Ala Tyr Pro Leu Val Val
50 55 60

Ala Met Leu Pro Asp Val Pro Glu Glu His Arg Arg Ile Leu Val Asp
65 70 75 80

Gln Gly Cys Ile Val Arg Glu Ile Glu Pro Val Tyr Pro Pro Glu Asn 85 90 95

Gln Thr Gln Phe Ala Met Ala Tyr Tyr Val Ile Asn Tyr Ser Lys Leu 100 105 110

Arg Ile Trp Lys Phe Val Glu Tyr Ser Lys Met Ile Tyr Leu Asp Gly
115 120 125

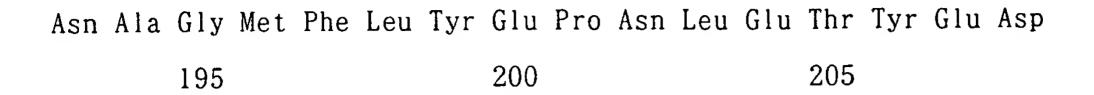
Asp Ile Gln Val Tyr Glu Asn Ile Asp His Leu Phe Asp Leu Pro Asp 130 135 140

Gly Tyr Leu Tyr Ala Val Met Asp Cys Phe Cys Glu Lys Thr Trp Ser 145 150 155 160

His Thr Pro Gln Tyr Lys Ile Arg Tyr Cys Gln Gln Cys Pro Asp Lys 165 170 175

Val Gln Trp Pro Lys Ala Glu Leu Gly Glu Pro Pro Ala Leu Tyr Phe

180 185 190



- Leu Leu Arg Thr Leu Lys Ile Thr Pro Pro Thr Pro Phe Ala Glu Gln
  210 215 220
- Asp Phe Leu Asn Met Tyr Phe Lys Lys Ile Tyr Lys Pro Ile Pro Leu 225 230 235 235
- Val Tyr Asn Leu Val Leu Ala Met Leu Trp Arg His Pro Glu Asn Val
  245 250 255
- Glu Leu Gly Lys Val Lys Val Val His Tyr Cys Ala Ala Gly Ser Lys 260 265 270
- Pro Trp Arg Tyr Thr Gly Lys Glu Ala Asn Met Glu Arg Glu Asp Ile
  275 280 285
- Lys Met Leu Val Lys Lys Trp Trp Asp Ile Tyr Asp Asp Glu Ser Leu 290 295 300
- Asp Tyr Lys Lys Pro Val Thr Val Val Asp Thr Glu Val Asp Leu Val 305 310 315 320
- Asn Leu Lys Pro Phe Ile Thr Ala Leu Thr Glu Ala Gly Arg Leu Asn
  325
  330
  335

# Tyr Val Thr Ala Pro Ser Ala Ala 340

<210> 2

<211> 335

<212> PRT

<213> Arabidopsis thaliana

<400> 2

Met Ala Pro Glu Ile Asn Thr Lys Leu Thr Val Pro Val His Ser Ala 1 5 10

Thr Gly Glu Lys Arg Ala Tyr Val Thr Phe Leu Ala Gly Thr Gly
20 25 30

Asp Tyr Val Lys Gly Val Val Gly Leu Ala Lys Gly Leu Arg Lys Ala

35
40
45

Lys Ser Lys Tyr Pro Leu Val Val Ala Val Leu Pro Asp Val Pro Glu
50 55 60

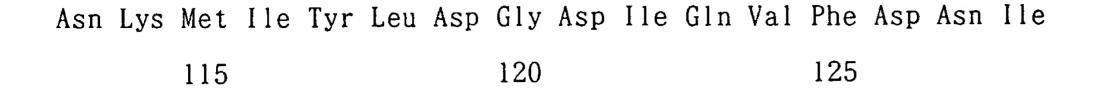
Asp His Arg Lys Gln Leu Val Asp Gln Gly Cys Val Val Lys Glu Ile
65 70 75 80

Glu Pro Val Tyr Pro Pro Glu Asn Gln Thr Glu Phe Ala Met Ala Tyr

85 90 95

Tyr Val Ile Asn Tyr Ser Lys Leu Arg Ile Trp Glu Phe Val Glu Tyr

100 105 110



Asp His Leu Phe Asp Leu Pro Asn Gly Gln Phe Tyr Ala Val Met Asp 130 135 140

Cys Phe Cys Glu Lys Thr Trp Ser His Ser Pro Gln Tyr Lys Ile Gly
145 150 155 160

Tyr Cys Gln Gln Cys Pro Asp Lys Val Thr Trp Pro Glu Ala Lys Leu 165 170 175

Gly Pro Lys Pro Pro Leu Tyr Phe Asn Ala Gly Met Phe Val Tyr Glu 180 185 190

Pro Asn Leu Ser Thr Tyr His Asn Leu Leu Glu Thr Val Lys Ile Val
195 200 205

Pro Pro Thr Leu Phe Ala Glu Gln Asp Phe Leu Asn Met Tyr Phe Lys 210 215 220

Asp Ile Tyr Lys Pro Ile Pro Pro Val Tyr Asn Leu Val Leu Ala Met 225 230 235 240

Leu Trp Arg His Pro Glu Asn Ile Glu Leu Asp Gln Val Lys Val Val
245 250 255



His Tyr Cys Ala Ala Gly Ala Lys Pro Trp Arg Phe Thr Gly Glu Glu 260 265 270

Glu Asn Met Asp Arg Glu Asp Ile Lys Met Leu Val Lys Lys Trp Trp
275 280 285

Asp Ile Tyr Asn Asp Glu Ser Leu Asp Tyr Lys Asn Val Val Ile Gly
290 295 300

Asp Ser His Lys Lys Gln Gln Thr Leu Gln Gln Phe Ile Glu Ala Leu 305 310 315 320

Ser Glu Ala Gly Ala Leu Gln Tyr Val Lys Ala Pro Ser Ala Ala 325 330 335

<210> 3

<211> 1064

<212> DNA

<213> Arabidopsis thaliana

<400> 3

atggctccgg ggcttactca aaccgctgat gctatgtcca ccgtgacgat aacaaaaccg 60 tcactgccat cagtccaaga cagcgatcga gcttacgtga cgtttcttgc tggaaacggt 120 gattacgtga aaggagtcgt tggtttagcc aaagggttaa ggaaagtcaa atcggcttat 180 ccactcgtag tagcgatgtt acccgacgtc ccggaggaac accgtcgtat acttgtggat 240 caaggatgca tcgtccgtga aatcgaaccc gtttacccac ccgagaacca aactcagttc 300 gccatggctt attacgtcat caactactct aaactccgta tctggaagtt tgtggagtat 360 agtaaaatga tatatttaga tggagacatt caagtttacg aaaacatcga tcacttgttt 420



<210> 4

<211> 29

<212> DNA

<213> Artificial Sequence

<220>

<223> Description of Artificial Sequence:primer

<400> 4

caaggatccg cagatcacgt gctaatcac

29

<210> 5

<211> 29

<212> DNA

<213> Artificial Sequence

<220>





## <223> Description of Artificial Sequence:primer

<400> 5	
---------	--

caaggatccc	ctggcaatca	agcagcgga
0 44 6 6 6 6 6 6 6 6 6 6 6 6 6 6 6 6 6 6	00000000	~~~~~~~~~

29

- <210> 6
- <211> 22
- <212> DNA
- <213> Artificial Sequence
- <220>
- <223> Description of Artificial Sequence:primer
- <400> 6

#### cgccacagta caagatcggt ta

22

- <210> 7
- <211> 20
- <212> DNA
- <213> Artificial Sequence
- <220>
- <223> Description of Artificial Sequence:primer
- <400> 7

catgaagagg cgtatgcagc

20

- <210> 8
- <211> 20



<212> DNA

<213> Artificial Sequence

<220>

<223> Description of Artificial Sequence:primer

<400> 8

ctttctcgga caagatggca

20

<210> 9

<211> 20

<212> DNA

<213> Artificial Sequence

<220>

<223> Description of Artificial Sequence:primer

<400> 9

gtgttgacaa gaacctcgct

20

<210> 10

<211> 32

<212> DNA

<213> Artificial Sequence

<220>

<223> Description of Artificial Sequence:primer

<400> 10



racaaatcca	tggctccggg	gcttactcaa	ac
geggaicea	1880100888	6 -	

32

- <211> 32
- <212> DNA
- <213> Artificial Sequence

## <220>

<223> Description of Artificial Sequence:primer

# <400> 11

- 32 cgcggatccc caccgacaat tttaactcct gg
- <210> 12
- <211> 30
- <212> DNA
- <213> Artificial Sequence

#### <220>

<223> Description of Artificial Sequence:primer

# <400> 12

- 30 cgcggatcca tggcacctga gatcaatacc
- <210> 13
- <211> 30
- <212> DNA
- <213> Artificial Sequence

	<220>	
	<223> Description of Artificial Sequence:primer	
	<400> 13	30
	cgcggatccg aggcgtatgc agcaacgagc	
	<210> 14	
	<211> 36	
	<212> DNA	
	<213> Artificial Sequence	
<u>.</u>		
ing work that	<220>	
	<223> Description of Artificial Sequence:primer	
	<400> 14	
	cgcggatcca tggcacctga gatgaacaac aagttg	36
	<210> 15	
	<211> 33	
	<212> DNA	
	<213> Artificial Sequence	
	<220>	
	<223> Description of Artificial Sequence:primer	
	<400> 15	
	cgcggatccc tggtgttgac aagaacctcg ctc	33